A PAUSE IN SPACE-TIME: SENSORY ASSEMBLAGE TO EMBED URBAN CONTEMPLATION

A PAUSE IN SPACE-TIME: SENSORY ASSEMBLAGE TO EMBED URBAN CONTEMPLATION

Research Portfolio

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O1 THE CITIES' CONFLICT OF ACCELERATION Introduction

This portfolio is a construct of research and its relation with design of the participation of the graduation course 'Heterogeneous City' by the Architectural Design Crossovers studio. The studio addresses the notion of heterogeneous flows and shifts in the contemporary city through a multidisciplinary approach. The individual project is based on the fascination of how time can be reconsidered in the contemporary city, in specific the city of London. Contemporariness brings the problems of fragmentation and a loss of the experiential dimension of time. The research therefore investigates architecture on the level of perception of time and senses. The research explores experiential potentials for urban architecture through sensory mappings and studies of how architecture formulates certain atmosphere's and events. Through research, a design of a sensory food hub emerged with emphasis on space-time. In the hasty city, architecture can generate potentials to cultivate experiential time throughout materiality, program and event.

The portfolio consists of a research plan, a research essay and reflection. Because of elaboration and the direction of the research, there is subtle difference in the contents of the plan and the essay as they don't fluidly follow the same alignment on the level of research questioning. This also depicts the development of the research, from the initial start definitions until the efficacy of the research findings for the purpose of the design phase of the project. The reflection is intended as an epilogue of the design part of the project, where the relevancy and relation between design and research is emphasized.

02 Research Plan SENSING A PAUSE IN LONDON

Spatial and sensory configuration to cultivate experiential pauses in the accelerated urban fabric of London's intensified Boroughs

The contemporary city of London interferes people with high levels of air or noise pollution, detachment from nature and the high speed in which one dwells in the city [1]. As London is expanding in population and emerging as a global economic city, the pace of the city is rising. This acceleration influences our perception of time and sensory experience in the urban fabric. This shift can be traced in the center Boroughs of London, where the perception of time is fragmented into fast travel, increasing working loads and sharp planning. Figure 1 depicts the buzz of intensive use of the city, which results in a city experienced by commuters as 'stressful' and 'anxious' [2]. These emerging problems caused by acceleration raises the need to find moments where one can pause in the city, to take a step back from this intensification and investigate the hidden architecture in London in which one experiences different levels of pause.

1 Waters, G. Warren, B. (2020) Tranquil City: Identifying opportunities for urban tranquility to promote healthy lifestyles. London

Founders of the 'Tranquil City' project published a manifesto about implications of the contemporary urban living conditions on the wellbeing of people. Present urban conditions make it difficult to live in 'tranquility'. The research brought a mapping project where one can find areas of low noise and air pollution within the city center of London in order to investigate how the residents can discover and benefit from tranquility in the dense and buzzed city life.

2 Miles, J. et al. (November 5, 2018) New research reveals the most stressful London borough to work in. Open Access Government. London

The following article reveals an analysis of the most stressful Borough's in London and shows that the centered Borough's consists of the most reports about stress and anxiety, based on data from social media.

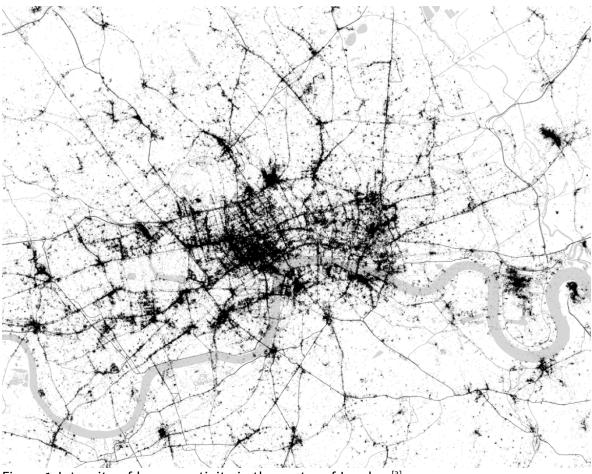


Figure 1: Intensity of human activity in the center of London [3].

3 Crowley et al. (2020)
'The last three months
on Foursquare'. Data
retrieved from:
https://foursquare.com/infographics/500millio

n

The map is a speculation on data by Foursquare. The intensity is depicted in the most recent Foursquare check-ins from August to October in 2020. The data only shows check-ins of specific target audiences that use the app and therefore not covers all the residents, visitors and tourists of London.

Architecture could have the potential in creating experiential narratives of pause formulated by the environment in which the residents of London dwell. For example, The appearance of people making certain associations with pause and architecture can be seen in work of Herman Hertzberger, where the spatial configuration and sensory elements such as light incites people to sit down and take a moment of retreat before returning to their daily activities (figure 2).



Figure 2: Montessorischool (1970) in Delft, Herman Hertzberger

However, as a hypothesis, the link between the architecture bringing a sense of pause and the urban conditions of the contemporary city of London is lost. Especially the experiential and spatial conditions of architecture which incite people to sense a stop in their rushed city life. The association of sensory and spatial experience formulated by urban architecture to generate moments of pause has dissolved in the accelerated urban fabric of the contemporary city. The aim of the research is to find and develop the architectural potentials to cultivate experiential pause into the intensified urban fabric of London and raises the following research questions.

Main question:

What are the architectural potentials to cultivate experiential pause into the intensified urban fabric of London?

Sub questions:

What types of pause can be found in the urban fabric and how are they defined by the architecture?

What are the thresholds of the bodily experience of pause formulated by spatial configuration, light, smell and sound?

To what extent can the phenomenon of pause be inserted as a spatial program in the contemporary urban fabric?

Theoretical framework

A pause is an interruption in an ongoing event, a moment where one feels slow and has a sense of retreat. This research aims to find out how this sense of retreat can be triggered by the spatial and sensory experience of architecture in the urban environment in London. Therefore, the focus within the investigation is framed within the philosophical domain, namely perception in architecture. The 'pause' is defined as an experiential moment, caused by architectural conditions such as spatial form, texture, light, smell and sound. Moreover, the pause is defined as a temporal act in space, it is inhabited in the bodies of people and multi-sensory. Multisensory meaning that one can experience architecture by vision, sound, touch, smell and even taste [4]. The survey in the methodology will address spatial form, haptic perception, light and darkness and sound and smell scapes [5].

Secondly, the pause incorporates a notion of time. Architecture can inhabit time, such as the 'wear' of concrete or the bodily experience of speed or slowness ^[6]. The investigation attempts to connect the sense of 'slowness' and sensory experience. In London, this experience of slowness or stop from the haste of the city remained to temporal art installations such as the Serpentine Gallery Pavilion by Zumthor. However, these kinds of projects are segregated from the city and thus not inserted in the urban environment. The research focusses particularly on the thresholds which are already merged into urban architectural objects and spaces that incite to sense a moment of pause.

4 Reza Shirazi, M. (2014)
Phenomenological
concerns in 'Towards an
Articulated
Phenomenological
Interpretation of
Architecture.' Routledge
London & New York.

Reza Shirazi reflects on the concerns within the field phenomenology by providing a list of 36 definitions. The stated definitions of existential space, multi-sensory experience, time and body as a unification of subject and object help to establish the definition of an experienced moment of pause.

5 Zardini et al. (2005)
Sense of the City: An
Alternate Approach to
Urbanism. Lars Müller
Publishers. Switzerland
Zardini unravels how one
can sense the urban fabric
with one's vision, seasons
of time, smell and sounds
and aims for rethinking
urban sense scapes. As the
city becomes
contemporary, smells and
noise change over time.

The research aims to find the dualities of moments of pause and the temporalities of it. For example, an urban terrace could function as an observation deck, but at the same time functions as a place of having a seat and coffee. The architecture remains fixed, but the events of different 'pauses' that take place in the space alternate. Programs of architecture no longer cause 'fixed' events but become temporal. Hence, the research is based on finding short temporal moments of pause in London's urban fabric, related to the concept of time by Kairos [7].

The site of survey is located in the centered Borough's, namely Westminster, Camden, City of London, Islington and Hackney. Namely, the users in these areas are residents and commuters working in the centered Boroughs of London who experience working in these Borough's as anxious and stressful [8]. This raises the question where these users could pause in their intensive area and what role the architecture plays for experiencing these moments.

6 Pallasmaa, J. (2016) Architecture Timed: Designing with Time in Mind. John Wiley & Sons Inc. London. p. 52

In the chapter "Inhabiting Time", Juhani Pallasmaa describes in what perspectives time can inhabit itself architecture and being. There is a loss of the experiential notion in time. The built environment from before the industrial revolution emerged in a slow pace, while the architecture of the present time appears in a fast emerging and impatient environment.

7 Madanipour, A. (2017) Cities in time: Temporary urbanism and the future of the city. Bloomsbury Publishing, London

To get inside the different times of the city, the article investigates the temporariness instrumental, existential and experimental level. On philosophical level, it examines personal experiences on temporary events in the city. A moment of pause can also be stated as a temporary event that occurs in the daily personal throughout the city.

Methodology

The pauses will be detected and analyzed to find out how they are specific to the conditions in London, and will then be compiled and sampled to establish a new architectural program of pause suited for the contemporary city of London. The methodology consists of four operations; experience notation, sensory mapping, analyzing the event of pause and analysis by sampling.

To investigate how the architecture in the urban environment of London formulates specific moments of pause, an inverted strategy of Tschumi's 'Manhattan Transcripts: The Block' will be used ^[9]. The analysis is based on drawings of the architecture where pauses are taking place in the site of survey. The founded architecture will be fragmented out of the urban environment and brought in an overview. The pauses formulated by the architectural conditions will be notated by ways of movement or stop. A fragment of the analysis is depicted in figure 3.

8 Miles, J. et al. (November 5, 2018) New research reveals the most stressful London borough to work in. Open Access Government. London

The following article reveals an analysis of the most stressful Borough's in London and shows that the centered Borough's consists of the most reports about stress and anxiety, based on data from social media.

9 Tschumi, B. (1994) The Manhattan Transcripts: The Block. Wiley & Sons. London

In the Manhattan Transcripts number 4, Tschumi analyses how unusual events can formulate space which thereafter confront architectural fragments of Manhattan. Where Tschumi tries to let the event formulate the architecture, the research will approach this project as a tool this to work the other way around, to analyze how architecture formulates specific pauses in London.

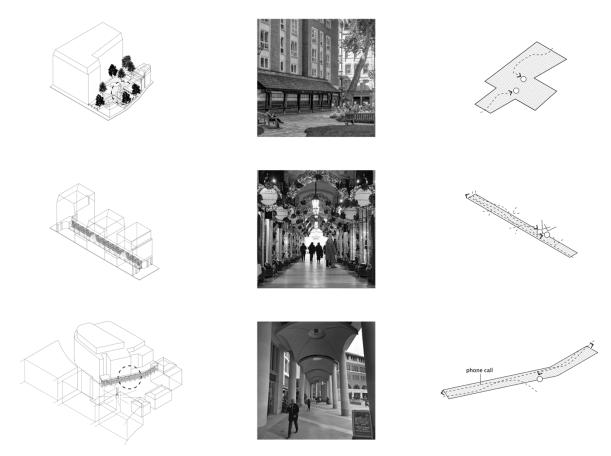


Figure 3: Architecture formulating moments of pause in London

A notation instrument will be used in order to notate and define what stops and moments of slowness are being performed by the users of London's urban fabric and on which architectural surfaces. The experience notation is based on the approach of Thiel [10]. The notation analyses the surfaces in which the user dwells and what kind of decisions and duration the walkthrough incorporates, people may stop or pause because of distraction, slow movement, observation or retreat.

The notations will be combined with sensory mapping, by mapping sense scapes of sound, light and smell which correlate with the event of pause. A mapping instrument of McLean is approached for the analysis of smell [11]. The findings are depicted in different colors and forms to express the different smells. The analysis of sound, vibrations light and darkness is executed by the technique of experiential mapping [12].

The findings will be compiled in order to make a catalogue of the London 'types' of pause. The catalogue of the notated and analyzed fragments will be sampled in order to establish new dualities in an experiential narrative of 'pause' suited for the user of the urban environment in London. Limitations on the chosen methods lie foremost in the execution of the survey, as there is no ability to track the sensory and spatial experience in the site of survey by audio recording, smell, drawing on location and videography due to the pandemic. Thus, sensory and experiential data will be collected from existing audio and video recordings by external sources. Moreover, analysis of architectural drawings which depict the senses and spatial configuration will be based on speculation.

10 Thiel, P (1961) A Sequence-Experience Notation: For Architectural and Urban Spaces. Liverpool University Press. Liverpool

The method is a system to track down the experience of space by the visual perception of surfaces, screens and objects. Furthermore, the system investigates perception on its duration and distance of moving through space. The system relevant to methodology as a starting principal to investigate at which moment in space, a moment of pause of specific perception, duration and relation to its spatial environment can be registered and notated in a systematic way.

11 McLean, K. (2020) Hospital Corridor Smellscape. Illinois State University.

The following sensory tool is a way to map different smells in buildings or in the urban environment. The smells are recorded by personal experiences of 27 patients, workers and visitors and depicted by different colors and forms to express the intensity and proportion of the smell.

12 Sun, J. (2014) Experiential map of Rome. Yale School of Architecture Gallery.

The project provides a tool to map bodily experience by drawing the architectural fragments such as facades and building interiors and walked pathways that influenced the experience and decision making in which the researcher moved through the city.

Argument on Relevance

Discussions on the sensory experience of space arise from 19th century debates in the phenomenology. By incorporating texture, smell, light and temperature in the design of architecture, sensory and haptic elements could be intensified in order to incite a certain perception of the space. However, designing or orchestrating experiences by certain parameters in architecture remained unknown as perception is ontological and thus different for each individual. There seems to be an ongoing shift from phenomenology to neuroscience, recent knowledge to work with building experience in a more precise way. The current tools in neuroscience can record experiences by investigating how people react, make decisions and bringing up certain emotions, caused by the environment they are in [13]. By tracking and mapping what people observe, experience and sense in architectural spaces of pause, this research could bring up potentials to understand how architectural conditions, specific to the environment of London, can affect the experience of the user in an urban setting.

Moreover, architectural experience often remains to building interiors and the architecture practice itself. The relation between phenomenology and architecture is already elaborated extensively in research debates, but what about the relation between phenomenology and the *urbαn* factor in architecture? The link between sensory experience of architecture and emerging urban environments seems lost in the field of architecture. Architectural spaces that have become 'urban', such as terraces, courtyards, balconies and slopes have found their way for use in the urban environment in London, but it is not clear why specifically these spaces bring a sense of pause. Therefore, the findings of the architectural and sensory mapping and analysis can establish a link between sensory experience and the accelerated contemporary urban conditions in London, focused on the moments of pause as an experiential element of architecture.

13 Ritchie, I. (2020) Neuroarchitecture: Designing with the mind in mind. John Wiley & Sons Inc. London

The literature brings an overview on how our senses, mind and emotions interact with the spaces we are in and how we orientate our body in or through space. Through the lens of present knowledge out of discipline neuroscience, one can understand how and why we are responding with certain emotions reactions in space and how architects can learn from this in order to design spaces for the senses and mind.

03

Research Essay
THE UNBALANCE OF TIME IN URBAN ARCHITECTURE

Cultivating a pause in London's accelerated urban fabric by spatial and sensory configurations

Abstract

As London is expanding in population and emerging as a financial global city, the pace of the city is rising. Factors as temporality and the notion of time as an experiential dimension is getting lost. A more sensory approach to urban architecture could have the potential to incite people to reside in other measures of time to contrast the dense intensive city of London. It has to be argued to what extent architecture cultivates these atmospheric moments in the urban conditions of the center Boroughs of London. The research stresses the notion of sensory and spatial experience formulated by architecture and its relation to urban conditions. A more sensory approach towards architecture is needed to balance out the reciprocity between space and time of the architectural fabric of the city.

Keywords: architecture, contemporariness, Isle of Dogs, London, pace, perception, phenomenology, senses, space-time

Introduction

The architectural fabric of London expresses itself to be time bonded in sense of perception. Infrastructural interventions such as the tube, change the experience of this fabric as we are rapidly 'passing by' the city scape. Juhani Pallasmaa, a Finnish phenomenological architect and lecturer addresses the reciprocity of space and duration, how we as humans reside in time to the same extent as being in space [14]. However, the way we act, perceive and live in the city has become more hasty than ever before. The built environment from before the industrial revolution has emerged and is expressed in a slow pace, while the architecture after the industrial revolution expresses impatience. Pallasmaa argues that one need a new perspective on the experiential factor of time, how one perceive slowness or speed by the experience of architecture. "Time [..] as an experiential and mental dimension is being lost" [15]. As a result, the accelerated conditions and the speed in which one endures in the present contemporary culture is conflicting with our perception of seeing time as a duration, rather than moment. Pallasmaa substantiates this notion by a statement of Paul Virilio, a French urbanist and philosopher. He argues how the role of pace has become crucial in the present day [16].

In London particularly, as a transcendence to the argument of Pallasmaa, this notion of residing equally in time and space has become unbalanced. It is presumed that the perception of time we find in the urban conditions in London gets the upper hand on the space we dwell in. This is for instance depicted in the emerging financial districts in the center Boroughs and how commuters' and residents' lives are planned on minutes and speed determined by public transport and working in a global These notions of financial center. acceleration subsequently reflected in an architectural fabric, depicted by contemporary architectures of glass and steel, only for facilitating the contemporary programs needed. The residue of this problem is found in a fragmentated urban fabric, where contemporary interventions and retransformations of area split up the socio-economical and architectural coherence. There is no space left for the architecture to land on the city and to get the ability to reside in time.

14 Pallasmaa, J (2016) 'Inhabiting Time' in Architecture Timed: Designing with Time in Mind. John Wiley & Sons Inc. London. P. 52

15 Idem

16 Virilio, P. (1994) The Aesthetics of Disappearance, Tampere. However, in my position architecture can have a large impact on depicting time in program, affordances or in an experiential way in materiality and thus has the potential to cultivate pauses in the space-time realm of the city, where time is being depicted in the architecture provoking to perceive time at another pace. Not only pace on the level of physical movement, but also on the level of architecture and program. For instance the Boarding School in Morella, where the spatial configuration is determined by a door that closes and opens during the day [18]. Thus, it is about moments where the architecture is in control of cyclical events, and not by modes of contemporary demands for the city.

The research investigates and questions whether with an event and sensory based approach on architecture, we can reconsider how we perceive duration and pace in architecture as a figurative pause in the hasty city of London. The aim is therefore to develop the architectural potentials to cultivate experiential notion of pace into the intensified and contemporary urban fabric of London. Moreover, it investigates thresholds of the bodily experience of different paces formulated by spatial configuration, program and affordances. Therefore, it aims to rethink space-time in urban contexts.

Implications of the contemporary city for space-time

In my perspective, contemporary architecture facilitate programs and events which only last for whenever they are relevant to a specific time. For instance the development of London emerging as financial center, decides on the architecture that appears in the urban fabric. To that extent, architecture becomes 'building', almost as a product to be replaced, while architecture should have the accessibility to bear in time [19]. However, this dimension only remains in examples where the architecture and interior creates certain light and material conditions to see traces of time, such as the flows of water and the aging of the concrete in Scarpa's Brion Cemetery [20]. But when the architecture is in an urban environment, the mediation of time is hard to perceive because of these immaterial conditions of the contemporary city. This can be found on an infrastructural level of for instance the speedy and sharp timed organization of the public transport. But also on modern media such as the attention to our smartphones when we wander through the cities' streets, where mobile screen's become a virtual space, an addition to

- 18 Miralles, E. (1994) Boarding School, Mirella. Spain.
- 19 Muzio, G. (2019) book cover quote of: Guiseppe Gambirasio, Bruno Mindardi: Interview with Giovanni Muzio. Divisare, Berlin.
- 20 Scarpa, C. (1972) Brion-Vega Cemetery, San Vito d'Altivole, Italy

the physical space we are already in. Even the notion of working days, a strict cyclical event which is in bound for economic purposes. In my opinion, we should emphasize the experiential factor of time. Time in a sense that it is not being temporal or 'controlled', but that we can just reside in a certain moment.

Ali Madanipour, a professor of urban design makes a distinction in the duration of temporariness, namely Chronos, long-term linear temporality, and Kairos, a more inner-body conscious state of time consisting of short moments [21]. The aim for this research is to approach time-based events as Kairos, short temporal moments of experienced in the innerbody. When these events are also become cyclical, as in annual or even daily. Then there is a potential for cultivation, by inserting a program in the contemporary urban fabric that is in a way 'fixed', but on the other hand is capable of triggering multiple events. For example, an urban tribune that becomes a place for having a seat with drinks, can also become a stairway of slow movement connected to a certain function in a building. In this way, the architectural conditions and configuration can incite people to have a activities of specific durations there. I want to emphasize here again the notion of the architectural configuration and its affordances to generate multiple events for people to experience. In this way architecture should not facilitate as opting for a 'solution' for demands, but rather be a catalyst wherein certain program and events are bound to be discovered. As stated in the example of an urban tribune, these type of affordances are often used in for instance an auditorium in an office building or a roof garden on top of an institutional program, but as addition to the main program. Ironically, it can be questioned to what extent architecture needs event, and to what extent event needs architecture.

Designing with cycles and duration

Tschumi argues that architecture does not exist without program and event [22]. But as said, it can also work the other way around, that certain events are provoked by the architecture [23]. In my interpretation, sensory factors can also provoke certain events or intrigue bodily experiences. What has been repetitive throughout research is how often times the architecture of courtyards and patio's in London intrigue people to contemplate. The architectural composition, materiality is bringing a program, and not program shaping

21 Madanipour, A. (2017)
Cities in time:
Temporary urbanism
and the future of the
city. Bloomsbury
Publishing, London. p.
144

22 Hann, R. (2012)
Blurred Architecture:
Duration and
performance in the
work of Diller Scofidio +
Renfro. Retrieved from:
https://www.researchg
ate.net/publication/271
939211 p. 10

23 idem

architecture. One of the architects incorporating the passage of time and duration in architecture is Spanish architect Enrique Miralles. Miralles approaches design as being supportive to natural phenomena, such as the cyclical motion of sunlight through the day or materials that catch shadow [24]. Moreover, not only in the relation between materiality and natural occurrences, but also on the level of program. In the Boarding School of Morella, a door opens and closes to connect different spaces throughout the day [25]. In this sense, architectural interventions are changing events and thus bring multiple programs happening during the day.

Moreover, besides interventions above ground, another design strategy is to insert architecture in the land-form also create potentials for the perception of the natural elements. A literal example is for instance the Moses Bridge (Figure 1). It is designed to blend as a pause in the flows of the landscape. These types of architecture make it accessible to come very close to landscape and experience all the natural durations and cycles such as the motion of the water and the change of color of greenery in seasonal cycles.

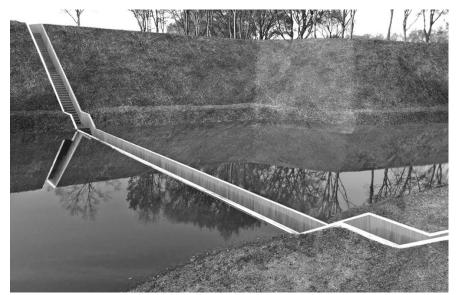


Figure 1: Moses Bridge [26]

However, these landscape projects don't appear often in the urban context, but temporal art events such as 'The Weather Project' by Olafur Eliasson or the Serpentine Gallery Pavilion stresses the notion of time while being situated in the center of the city of London [27] [28]. Here, the space, material and light conditions drive people to rethink and generate an awareness of time and contemplation. When having these specific perceptions in the middle of the city, the contrast may even

24 Miralles, E. (2016) Time as a Medium: Early Work of Enric Miralles, in Architecture Timed: Designing with Time in mind. John Wiley & Sons. London. p. 62

25 idem

26 Koster, R. Kil, A. (2011) Moses Bridge. Halsteren.

27 Eliasson, O. (2003) The Weather Project. Tate Modern, London.

28 Zumthor, P. (2011) Serpentine Gallery Pavilion. London. be bigger. Then the architecture is not just a pause, but an escape from the flows in the urban fabric.

29 Hertzberger, H. (1970) Montessorischool, Delft.

Finally, on the built-form, the affordances emerging by spatial configurations can be seen in for example the Montessori school by Herman Herzberger, where the design of a wall-into-bench transformation and the appearance of sensory elements such as shadowing generate an affordance for people to sit and take a moment of retreat before returning to their daily activities (figure 2). To sum up, there are multiple approaches from the basis of natural cycles and atmosphere's, program configurations and spatial configurations to generate certain atmospheric moments which follow into a certain activity.



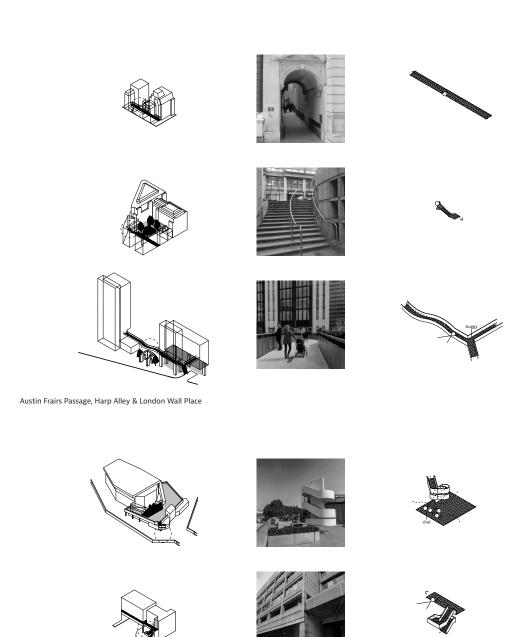
Figure 2: Montessorischool [29]

Mapping the experiential

To bring back the notion of the contemporary city, it has to be questioned how the architecture detected in London find its way with atmospheres based on time and duration. To detect these moments in the way Londoners wander around the urban fabric, a notation instrument is used based on Thiel's 'Sequence-Experience' notation [30]. This notation distinguishes the surfaces, screens and object that establish the space in which one moves. The configuration of the space let the person make decisions on walking, turning left or right, making stops, and so on. These decisions are then mapped into a timeline, measured in how much seconds each action takes. A limitation when using this notation is the fact that a pause not always appear within a linear movement of walking. A full evening spend in a leisure program can also be defined as a sensory experience of pause outside the haste. Therefore, to define the pauses within London's urban fabric, the notation are only be interpreted as mapping the experiential moments, rather than movements in a linear sequence.

In addition to the mapping, the atmospheric and spatial conditions which are being mapped will thereafter cause different experiential moments and atmospheres. For example moments of contemplation in a courtyard or pausing for a view on an urban deck. Based on the 'action theory' in philosophy, by architectural objects as sitting places or stairs, people will act specific human bodily movements. People may stop or pause because of distraction, observation or relaxation. The type of 'event' which defines the pause becomes important. It has to be identified what the typical events of pause are in the architectural conditions of London. A tool used for analyzing events of pause is an inverted strategy of the 'Manhattan Transcripts: The Block' by Tschumi [31]. Where Tschumi tries to let the event or program formulate the architecture, the analysis of this research investigates how architecture formulates the event, the event of pause. By cutting out fragments of the urban fabric on the architectural scale, the typical London events of pause can be defined. These fragments can be sampled in order to develop a strategy for designing a spatial program of pause, tailor-made for the urban conditions in London. A combined interpretation of sequence notation and architecture formulating the pause is illustrated in figure 3.

- 30 Thiel, P (1961) A
 Sequence-Experience
 Notation: For
 Architectural and Urban
 Spaces. Liverpool
 University Press.
 Liverpool.
- 31 Tschumi, B. (1994) The Manhattan Transcripts: The Block. Wiley & Sons. London.
- 32 Kuijpers, B. (2020)
 Architectural mapping:
 Events formulated by
 the architecture
 [unpublished]



Queen Elizabeth Theatre, Mermaid London, NSC Global

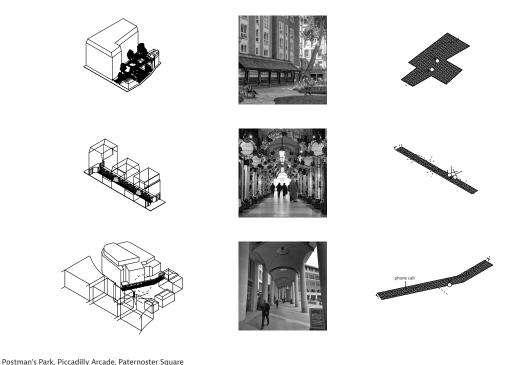


Figure 3 [32]

What can be concluded from the mapping is the fact how there is a repetitive pattern of enclosed and almost 'hidden' atmospheres, either above or below ground level and sometimes with the presence of natural elements. Some spatial configurations even provide a certain extent of 'distraction' from the hasty atmosphere of the city scape of London. The spatial and sensory conditions provoke certain events of contemplation, looking out, distraction or physical slow movement.

Furthermore, the moments which are being mapped are involved with sensory elements such as light, acoustics and so on. Even the spatial form itself brings a sense of atmosphere, the body detects size, dimension and level of intimacy and questions how one relates the human scale to the proportions of space [33]. This research uses mapping of senses to investigate which certain smell, sound or light conditions are correlated to London's specific atmospheric moments such as pause or contemplation. Here, the relation between sensory perception formulating the moment is made clear. Atmosphere is not only about physical appearances, but even more about immaterial conditions such as light, taste and smell. A mapping technique of McLean is relevant in order to map smell on an urban scale, depicted in figure 4. A particular difference of smell and for instance natural light found in the

33 Zumthor, P. (2006) Atmosphere's. Birkhäuser. Basel. p.48-55

34 McLean, K. (2020) Edinburgh Smellscape. city scape is the fact that these smells can appear or disappear and in a way are contemporary, while natural light and shadow has a natural consistent cycle throughout the day.

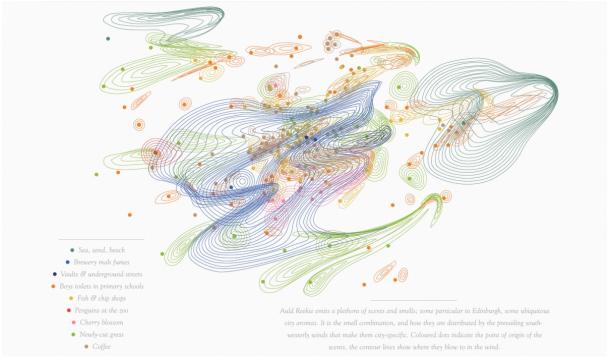


Figure 4: smell mapping [34]

The technique can be helpful for the architecture to connect on sensory conditions of smell scapes in the project site, for instance the choice of letting in smells of greenery in rooms and spaces, or the atmospheric conditions of a restaurant, full of kitchen smells. In this sense, the choice of incorporate or exclude the apparent sensory condition into an architectural project. To remain the relation between architectural and urban scale, and compile atmospheric conditions in an experiential mapping, a technique of Sun is approached to map the experience of the urban fabric as well as urban scape, depicted in figure 5. A thing to question here is the level of individualism. It is inevitably that perception is a personal phenomenon. However, in my perspective, architecture does not always have to provoke atmospheric conditions for the individual. What about contemplation together, gathering around on urban squares or terraces or cooperative acts such as workshops? The moments when we meet could also incorporate notions of a certain 'common' atmosphere experienced. Therefore, when designing for the atmosphere and a mediation of time, there should be a concept which can be obviously experienced on an individual level, but also on a general common level.



35 Sun, J. (2014) Experiential map of Rome. Yale School of Architecture Gallery.

36 Kuijpers, B. (2021)
interpretation of
experiential mapping in
Isle of Dogs, London.
[unpublished]

Figure 5: Experiential mapping [35]

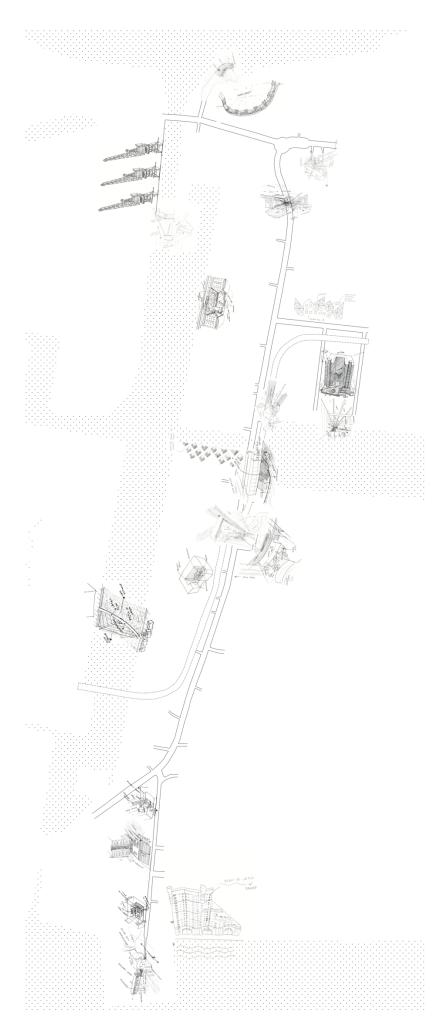


Figure 6, experiential mapping of a transect in Isle of Dogs, London. [36]

Debates on sensory experience in relation to urban architecture

Discussion in the architectural field on the phenomenon of perception, the bodily experience of architecture made its entrance at the end of the 19th century when architects considered ontological theories from philosophers as Merleau-Ponty relevant to architecture. Within perception, the following paragraph focusses on the practicality of dealing with the experiential factor of architecture. Experience becomes crucial for intensifying sensory and haptic elements which drive people to experience a pause. As Steven Holl states, "phenomenology is a discipline that puts essences into experience" [37]. Holl made the link from phenomenology to multisensory experience, to make it operational in architecture by designing with certain texture, smell, light, temperature of materials and so on [38]. This argument becomes interesting, as the premise of a building no longer just becomes a function such as facilitating office space, but rather generates experiences which people can bring back home as a memory, to cultivate it in their minds and think about it. However, the extent in which sensory qualities can be cultivated into the urban architecture remains to be doubted. The relation between cities and sensory qualities has been argued as becoming more problematic. Porteous already pointed out that further urbanization will depict the city as a 'sensory blackspot' [39]. In this sense, sensory qualities are being excluded and only left to be found in private realms or rural areas. Therefore, architectural potentials to cultivate sensory qualities become crucial to let this not fade away in the acceleration of urbanization.

The way one perceives the urban environment as a fast and buzzy object in which one dwells. As discussed in the methodology, the architectural factors which make this happen are important. Which architectural elements in the urban environment of London incite people to experience a certain level of pause, in which architectural objects and spaces of the city do they pause and why? Linked with the discussed methodology of establishing transcripts of pause in London, I aim for making explicit further elaboration on the relation of experiential architecture to the urban environment, where urban and architectural conditions continuously intertwine and we don't have to depend on the time of the city. Sensory perception should be made more publicly accessible. Therefore, a experiential approach of urban

37 Holl, S. (2000) Parallax. Birkhäuser. Basel. p. 68

38 Reza Shirazi, M.
(2014) 'Practical
phenomenology of
Steven Holl' in Towards
an Articulated
Phenomenological
Interpretation of
Architecture. Routledge
London & New York.

39 Porteous, J.D. (1996) Environmental Aesthetics: Ideas, Politics and Planning. Routledge, London. architecture is needed to provide these places to experience other dimensions of time to bring a balance in contradiction to the technological and economical time flows. Whenever we are hasty, we can pause. Whenever we are stressed, we can reside on the flows of nature. Architecture should facilitate that more explicitly in urban conditions. Sensory atmosphere as a program.

Conclusions

As designers in the urban field, one should be aware of the notion of time, how other dimensions such as infrastructural and technological time can have an impact on the way we reside in time, just as we reside in space. Therefore, operating with the perception of architecture can help work with these different levels of pace and duration. Approaching architecture not as a mode to serve a fixed program, but as a catalyst for atmospheres to be experienced and events to be emerging by affordances.

On the level of architectural operations, working with time as a sensory instrument can be explored throughout multiple assets of the project, namely on program, spatial configuration and materiality. The landform can play a role in the sense of exploring new urban qualities in London, involving natural rhythms and flows such as the flows of water or the cyclical changes of greenery. The same happens on the level of materiality, where the aging of material could be a medium to express duration. What is being experienced or found in the sensory atmosphere brings certain space for activity. Hence, these atmospheric conditions could be approached as the base of what people will perceive or do in space. In this sense, the sensory and spatial atmosphere act as an affordance, just as a London typical courtyard generates a sense of contemplation. We don't facilitate demands by architecture, but architecture Is more likely approached to provoke certain experience.

Thirdly, on the perspective of getting grip on the sensory and haptic elements found in the urban fabric. Experiential mappings provide for the architecture the possibilities of embracing or excluding certain senses and blend the sense of the city scape into the architectural project. The level of individualism should however be questioned when mapping personal experience. A more common approach on working with senses of the environment in the design could generalize sensory atmosphere's as a more general theme elaborated in the design. The findings of the mappings result in a repetitive pattern of program where we can escape from the city. This stresses the demand of having these affordances to experience other paces in the qualities of urban life.

Finally, further elaborations on the relationship between sensory perception and urban architecture should be stressed to deal with this unbalance of time in urban architecture. In my perspective, phenomenological concepts in architecture often remain to building programs, but there is a potential to blend phenomenological architecture in the urban context and work with the senses and affordances we find in the city scape and patterns of pocket's and corridors in London typically shows us the importance of having these places to escape from the haste we experience in the contemporary city.

04

Reflection

DEFRAGMENTATION THROUGH A SENSORY FOOD HUB

Relationship between graduation topic, studio topic and master program

My fascination for the master architecture lies in the bodily perception of space. How the configuration and materiality of space and its inhabitation in time intrigues us. In my position, we lost our grip on the notion of time when making architecture, as architecture often tries to facilitate tailor-made programs for specific events happening in the city, caused by accelerated and temporal flows and cycles which determine a contemporary architectural fabric. In my opinion, it should work the other way around in the sense that the architecture and materiality of space should provoke certain activity and program. Therefore, it was inevitable to go for a studio which not start throughout a fixed program, but rather throughout the architecture found in the urban fabric to stress this conflict of temporariness.

Graduation studio 'Heterogeneous City' approaches London as a contemporary city which bears hybrid urban complexities and thus gives the freedom to investigate spatial disconnections caused by all the flows, cycles and activities found in the city, by exploring the immaterial of the multidisciplinary urban context. The project therefore deals with the emerging urban complexities of the heterogeneous flows of time and architectural transformations found in the fabric of London. It therefore tries to stress how architecture can play a role to mediate with this fragmentation of urban development and how we can take a pause from these accelerated cycles as a new urban experiential quality.

Relationship between research and design

An open and intuitive approach of exploring the 'pace' of the city led me to an analysis based on the architecture where one tries to escape from the haste of the city to contemplate, for instance in pockets, patio's, on observation decks and under shelters. Here I noticed the relevance of how architecture is related to bring a sense of time as an experiential phenomenon. It happened to not only being manifested in a repetitive pattern of typologies such as pockets or courtyards. Likewise, contemporary interventions close to the project site such as the South Quay light rail situated over the industrial docks brought new spatial qualities to the quays. In this sense, by the discontinuities of industrial identities as well as the formation of new contemporary urban conditions, new hybrid spatial meanings are generated (Figure 1). There I found the exception, where the experiential factor is not facilitated by a program anymore.

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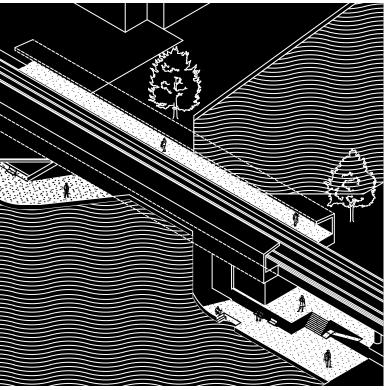


Figure 1, light rail generates a new spatial quality of the 'old' quay at water side

Hence, the relation between research and design is focused on the experiential qualities found on the project site and its peculiar social context which is fragmentated by the contemporariness of the transformations going on on site. Therefore, I focused on finding the causalities between time and perception, moments when architecture can be used as a medium to let people dwell in and perceive different paces, like cycles of daily or annual events and activities, the aging of material and seasonal changes of nature. Moreover, fragmentation became a second path taken in the development of the research as this became a point to problematize how transformations in Isle of Dogs are causing disconnections in the social realm. Therefore, as a design strategy, the project acts as a mediator of the different redevelopment cycles found in the area (figure 2).

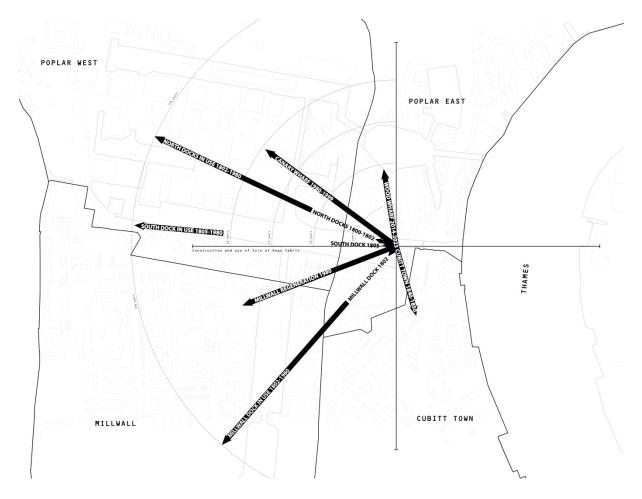


Figure 2, the project has to deal with multiple retransformations in the area

Tidal cycles and the flows of industrial as well as recreational boat traffic, passing the lock and entering the docks around 200 times a year. Up until today, the West India Entrance Lock is the only way to access the docks in the island, and its maritime importance is visible in the presence of maritime scout activities, the mooring of recreational vessels and a steam tug museum. I realized the importance of the maritime actors and the South side of the Dock, Cubitt Town, a broad mixture of institutional, industrial and residential flows. This also points out the ethical challenges of a design project. Not every aspect of the architecture can be prosperous for its environment, but what's really the main relevancy of the project for its site and for which actors, is a question that should always be taken into account.

At the process of going from the comprehension of the site into the first steps of design, I approached the contours of the quay and dock as grid for building the masses, which not helped me develop a formal language. But by neglecting the quay as a building envelope of the project, a more embraced link of the project with the water was made accessible. Embraced in the sense that the water and its experiential qualities will not 'stop' from the start of the façade envelope, but rather flows through under the roofscape of the building all the way into the interior envelope. An ensemble of tilted canopies helped me build the formal expression in which the building faces towards the quays and entrance lock as well as facing towards 'itself' as a new public 'center' or 'plaza' for the area, under shelter of roofing to try to provoke social gathering with the residents from the fragmentated areas (Figure 3).

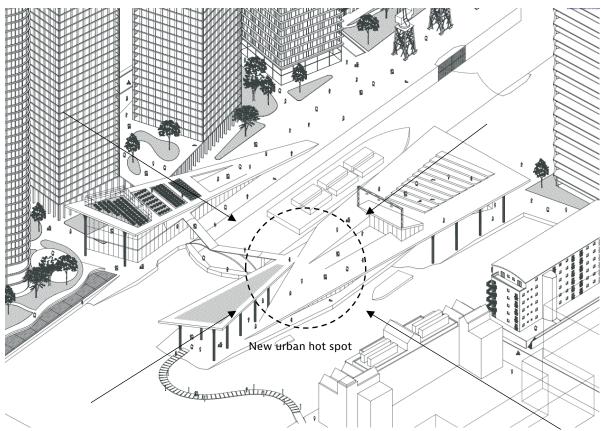


Figure 3, concept sketch of the project creating a sense of urban center

When the form was set in concept, I immediately went through different scales to incorporate the notion of time and pace, in program and materiality. The 'mediation' of time of the spatial program requires to integrate the water related qualities found in the tidal cycles of the lock system, material corrosion and the experiential materiality of water itself, such as sound, reflection and rhythm of the waves (Figure 4). Moreover, the facade should not be a physical 'border' between interior program and exterior program, but be approached as a number of experiential thresholds, beginning from the water all the way to the core program of the building.

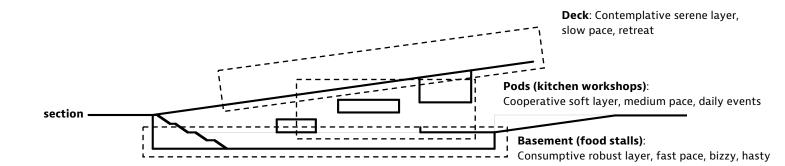


Figure 4, Diagram of the experiential time-based layers of program in the design

Ethical & social challenges

The project acts as a public food hub where engagement of growing, making and consuming food is being activated by the integration of a public route through the program. The sociological and socio economic conditions not remain on ground but transgress the water by the supply of food by vessels. Moreover, recreational boats can moor and participate 'under the roof' of the project. In this sense, both residents of the site as well as visitors will experience the architecture. From a social point of view, I learned to be concise about the level of engagement, The social program of community kitchens and a market space helped me develop this engagement of the complex network of people found in the site, middle class residents, workers and high class and luxurious demanded actors on the side of Canary Wharf. In this way, one program can let these complexity of social groups and classes merge (figure 5).

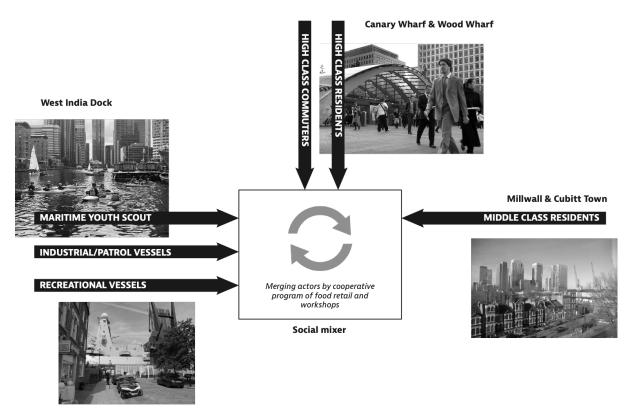


Figure 5, Diagram of the project mediating as a social mixer

Conclusion & scientific application

In the process from research to design, I learned to keep in mind as much as possible what the core premise is of the project and try to keep that very consistent throughout the whole project, since I'm regularly bound to take a couple of side paths throughout my research development. I stress here the preciseness of terminology as a way of communicating design concepts and research. Continuously bringing new terms to the table to incorporate in the research and design can become problematic on the level of significance. I rather try to focus on carefully taking my position in a term such as 'pause' or 'fragmentation' and develop this position throughout the process rather than getting lost in side paths of multiple subtheme's of the research.

The results of the project are applicable in the field of ongoing debates in architectural operations incorporating the notion of time and duration to the extent of perception, materiality and program. Hence, the architecture is formed on an urban perspective. Therefore, it tries to defragment the area by means of social mixing and finally, approaching architecture as a mode to mediate different cycles and flows of time which can be experienced on a sensory level through its materiality and spatial qualities. The outcome of the intervention can be projected on sites where the manifestation of contemporary architecture is causing fragmentation and where it has to be questioning how architecture can be more in control of time, provoking new urban qualities on the level of sensory perception.

Glossary

Acceleration

In this research, acceleration is defined as the level of change in the velocity of ones perception of time when dwelling in the city. The increase of work load, commuting from different areas to offices by fast public transport and the haste in which we dwell has shifted the way in how one perceives the city of London. This brought an architecture of for example the expansion of glass and steel high rises in the financial district. Thus, 'acceleration' here can also be seen as an architectural expression in the urban environment.

Defragmentation

As a contradiction to fragmentation, defragmentation is defined in this research as reconnect and merge what has been split up, distinguished or segregated before. In the perspective of architectural practice, this can be found in social or socio-economic segregation, esthetics, and program. Fragmentation can be found for instance in different social classes and architectures next to each other, but without intertwining or mixing up.

Pause

A pause in its literal sense is a temporal stop in action. The pause is always related and/or relative to the action where it is situated in. The definition addresses temporariness and interruption. On the phenomenological level of this research, the pause is an experience of retreat. More specific, the experience of a relative slow down or stop in a sequence of behavior. The phenomenon appears in the mind of the human body and involves sensory elements such as sound, smell and light.

Pace

Pace can be derived from the musical defined term 'tempo', and is originally based on the Latin word 'Passus', which means 'step'. The tempo addresses the duration of an action. In this research, pace as time phenomenon is also connected to repetition, actions going after one other with a specific duration and distance. In this way, a pause in between a moment of speed can be considered. Thus, it describes the level of acceleration in time and repetition. The acceleration can be defined as velocity or speed of the action.

Perception of space

The phenomenon of perception is approached from the view of Lefebvre's first, second and third space. The first space is the physical perceived space, it is being appropriated. The second space is the conceived space, on a mental level. The third is the lived space, which is more of a social approach of how space is directly lived. To make the connection to time, the definition of perception of space in this research is also being interpreted as a *moment*. A moment in time in which pause appears and what is being perceived mentally when being in that moment of pause.

Perception of time

Time is the continuum of a progress or activity of existence. According to Junestrand & Tollmar, the perception of time can be approached in three different ways, *linear*, *cyclical* and *pluralistic*. On the cyclical level, time becomes a rhythm, which can distinguish itself in a repetitive or free rhythm. In a repetition, actions are follow up on each other in the exact same duration or distance. In a free rhythm, the actions in a sequence are distanced each other differently and more random. Secondly, linear time moves in a one-dimensional direction. Finally, pluralistic time can be interpreted as incidental time, caused by an unexpected event. Bibliography

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